## Modules on OASIS Update

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## Environment Modules on OASIS - Updates

- Lmod and python installed on OASIS
  - Python 2.7.7 with Numpy, SciPy, NLTK, matplotlib, scikit-learn, and pandas
  - Python 3.4.1 with Numpy, SciPy, matplotlib, and pandas
  - Working on getting R and Octave installed
  - Converted a friendly user to using Lmod and Python from OASIS
    - User was able to run production workflows succesfully

#### Python module functionality on OASIS

 Tested Python functionality when run using modules on various sites that OSG Connect

Site	Python 2.7.7	Python 3.4.1
AGLT2	<b>✓</b>	<b>✓</b>
BNL	<b>✓</b>	<b>✓</b>
Crane	<b>✓</b>	<b>✓</b>
Cinvestav	<b>✓</b>	<b>✓</b>
MWT2	<b>✓</b>	<b>✓</b>
Nebraska	<b>✓</b>	<b>✓</b>
UConn	<b>✓</b>	<b>✓</b>
UCSD	<b>✓</b>	<b>✓</b>
UTA_SWT2	<b>~</b>	<b>✓</b>

# Python module functionality (Continued)

 Also tested python libaries (checkmarks indicate successfully being able to use module):

Site	NumPy	SciPy	NLTK	MatplotLib	Pandas
AGLT2	<b>✓</b>	<b>v</b>	<b>✓</b>	<b>✓</b>	<b>✓</b>
BNL	<b>✓</b>	<b>✓</b>	<b>✓</b>	<b>✓</b>	<b>✓</b>
Crane	<b>✓</b>	<b>✓</b>	<b>✓</b>	<b>✓</b>	<b>✓</b>
Cinvestav	<b>✓</b>	✓	<b>✓</b>	<b>✓</b>	✓
MWT2	<b>✓</b>	<b>✓</b>	<b>✓</b>	<b>✓</b>	<b>✓</b>
Nebraska	<b>✓</b>	✓	<b>✓</b>	<b>✓</b>	<b>✓</b>
UConn	<b>✓</b>	<b>✓</b>	<b>✓</b>	<b>✓</b>	<b>✓</b>
UCSD	<b>✓</b>	✓	<b>✓</b>	<b>✓</b>	✓
UTA_SWT2	<b>✓</b>	✓	<b>✓</b>	<b>✓</b>	<b>✓</b>

### **Module Tracking**

- Based on work done at Harvard by John Brunelle and James Cuff
- Added a hook to modules code that contacts webserver whenever a module is loaded
- Web script that receives contact and records site, hostname, user, and module into database
- Proof of concept working, adding to OASIS install